CLAIMS

1. Compression moulding manufacturing method for plastic parts (1) with a neck (3) provided with an orifice, comprising a first step for making a plastic blank (20) and a second step for compression of the said blank, in which the said blank is brought to an appropriate temperature and is then placed in the air gap between at least two moving parts (30 and 35) of the compression tool and is then compressed by bringing the two mobile parts of the tooling towards each other, the plastic material of the blank flowing so as to fill the cavities in the said mobile parts until the said mobile parts stop moving relative to each other, the cavities of the said mobile parts of the tooling once brought together defining the volume of the said part with a neck, the said cavities being designed such that the said neck, once moulded, has a top wall (4) that comprises a thinned zone (6) for which the contour delimits the required shape of the orifice, the said method being characterised in that the said thinned zone (6) is bounded by a notch (5) for which the section in a diametric plane passing through the axis of the neck is oriented along a direction approximately parallel to the axis of the neck (100), and in that the said top wall (4) also comprises a zone (91) in which a mechanical force (F) is applied that will be applied to the said top wall with sufficient intensity to break the top wall at the said notch, the said application zone being distinct from the said thinned zone, the said top wall also including two zones (7 and 8) that

can resist the said mechanical force (F), one (7) of them being designed to transmit the said mechanical force and the other (8) to act as a support, and in that after opening the said moulding tool by relative displacement of its mobile parts, the next step is to apply the said mechanical force in the said application zone (91) such that a break will occur at the said notch and at least part (14) of the top wall is detached thus opening up the dispensing orifice.

2. Method according to claim 1, in which the breakoff zone (6) breaks during cooling after moulding, as soon as the temperature of the plastic material becomes close to its vitreous transition temperature in the said breakoff zone.

3. Process according to claim 1 or 2, in which the breakoff zone (6) comprises a V-shape notch, the angle of the V being between 30 and 90° and preferably between 40 and 50°, the bisecting line of the V forming an angle of between 0 and 45°, and preferably between 0 and 30°, with the axis of the said neck.

4. Method according to any of claims 1 to 3, in which the top wall (4) comprises a transverse wall (7) and a stick (9) at the end (91) of which a force (F) is applied laterally to cause breakage of the breakoff zone (6).

5. Process according to any of claims 1 to 3, in which the top wall (64) comprises a wall (65) which, after moulding, is torn off and then removed by applying an axial thrust.

6. Method according to any of claims 1 to 3, in which the top wall (24) comprises a transverse wall

(25) acting as a shutter and a protuberance (29) with a T-shaped profile, such that it has a ring groove (28) on its outer surface in which the prongs of a fork (40) or a rail (40') are engaged, the relative displacement of which causes tearing off and then removal of the said shutter.

7. Method according to any of claims 1 to 3, in which the top wall (74) is a protuberance (75) with a non-convex polygonal section, typically a star, which is torn off and then removed by a rotation or unscrewing movement.

8. Method according to any of claims 1 to 7, in which the compression moulding tools (30 and 35) are also moved by a continuous movement orthogonal to the direction along which they move towards each other.

9. Method according to claim 1, in which a compression tool with a first mobile part (830 + 805) and a second mobile part (835) is used, the said first mobile part, at least in the part of the cavity used for shaping the said breakoff zone (86), being made of a material that is less rigid than the material used for the said second mobile part.

10. Method according to claim 9, in which the said first mobile part (830 + 805) is made of plastic material, at least in the cavity part used for shaping the said breakoff zone (86), while the second mobile part is metallic.

11. Method according to claim 10, in which the said first mobile part (830 + 805) comprises a cavity provided with a stopper (805) to close off the said orifice, the said stopper being positioned so that its

inner surface acts partially as a moulding cavity for shaping the said neck (83), at least at the breakoff zone (86).

12. Process according to any of claims 9 to 11, in which the breakoff zone (86) is shaped using a toroidal edge (90) forming part of the punch (835).

13. Process according to claim 11, in which the breakoff zone (86', 86") is shaped using a toroidal edge (90', 90") forming part of the stopper (805).